

### The Vision for the new Faculty of Biology, Medicine and Health

July 2016

Ian Greer, Vice President and Dean, Faculty of Medical and Human Sciences





### Why do we need to change?

- To create the best possible structure for the ongoing success of both the Faculty of Life Sciences and the Faculty of Medical and Human Sciences
  - Need emphasised by REF 2014
    - UoA 1 GPA 12, Research Power 11
    - UoA 5 GPA 21, Research Power 4
    - QR loss
- To promote better collaboration and integration of science in biology medicine and health to exploit our strengths not previously deployed optimally
- To develop a more translational approach to research from discovery to health care

CHAR

- To support and help deliver the University's M2020 vision
  - world-class research
  - outstanding teaching, learning & student experience
  - commitment to social responsibility



### FBMH academic structure

The University of Manchester

|    | DOCTORAL ACADEMY  |  |  |  |  |  |
|----|---|--|--|--|--|--|
|    | SCHOOL OF BIOLOGICAL SCIENCES                                 | SCHOOL OF MEDICAL SCIENCES                                   | SCHOOL OF HEALTH SCIENCES  |  |  |  |
| NS | Division of<br>Cell Matrix Biology<br>& Regenerative Medicine | Division of<br>Cardiovascular Sciences                       | Division of<br>Human Communication,<br>Development & Hearing                 |  |  |  |
|    | Division of<br>Evolution & Genomic Sciences                   | Division of Dentistry  | Division of Informatics,<br>Imaging & Data Sciences                          |  |  |  |
|    | Division of<br>Infection, Immunity<br>& Respiratory Medicine  | Division of<br>Developmental Biology<br>& Medicine           | Division of<br>Nursing, Midwifery & Social Work                              |  |  |  |
|    | Division of<br>Molecular & Cellular Function                  | Division of<br>Diabetes, Endocrinology<br>& Gastroenterology | Division of<br>Pharmacy & Optometry  |  |  |  |
|    | Division of<br>Musculoskeletal & Dermatological<br>Sciences   | Division of Medical Education<br>(including CHSTM)           | Division of Population Health,<br>Health Services Research<br>& Primary Care |  |  |  |
|    | Division of<br>Neuroscience & Experimental<br>Psychology      | Division of<br>Molecular & Clinical Cancer<br>Sciences       | Division of<br>Psychology & Mental Health                                    |  |  |  |

#### STRATEGIC RESEARCH DOMAINS

- Cancer
- Cardiovascular, Metabolic & Nutritional Sciences
- Cellular & Developmenta Systems
- Evolution, Systems & Genomics
- Infection, Immunity, Inflammation & Repair
- Neuroscience & Mental Health
- Platform Sciences & Technologies
- Population Health & Ecosystems

### FBMH senior management team

The University of Manchester

MANCHESTER



Associate Deans / Deputy Associate Deans (DADs)



### Assigning individuals to the new Divisions

The University of Manchester

- 48 appeals considered by the Arbitration Panel
- Everyone's new Division confirmed via email on 3 February
- Divisional membership lists published 4 February

| SCHOOL OF BIOLOGICAL SCIENCES                              | 273 | SCHOOL OF MEDICAL SCIENCES 32                                | 28 | SCHOOL OF HEALTH SCIENCES   | 341 |
|--|-----|--|----|---|-----|
| Division of Cell Matrix Biology<br>& Regenerative Medicine | 27  | Division of Cardiovascular Sciences 35                       | 35 | Division of Human Communication,<br>Development & Hearing                 | 37  |
| Division of Evolution & Genomic Sciences                   | 36  | Division of Dentistry 96                                     | 96 | Division of Informatics, Imaging<br>& Data Sciences                       | 27  |
| Division of Infection, Immunity<br>& Respiratory Medicine  | 63  | Division of Developmental Biology 30<br>& Medicine           | 30 | Division of Nursing, Midwifery<br>& Social Work                           | 109 |
| Division of Molecular & Cellular Function                  | 43  | Division of Diabetes, Endocrinology 28<br>& Gastroenterology | 28 | Division of Pharmacy & Optometry  | 75  |
| Division of Musculoskeletal &<br>Dermatological Sciences   | 39  | Division of Medical Education 84 (including CHSTM)           | 34 | Division of Population Health,<br>Health Services Research & Primary Care | 43  |
| Division of Neuroscience<br>& Experimental Psychology      | 65  | Division of Molecular & Clinical<br>Cancer Sciences 55       | 55 | Division of Psychology & Mental Health                                    | 50  |

#### *The numbers* Core academics by School and Division



The University of Manchester

Growing the best and brightest The drivers of research excellence. Report for DBIS 2014. Word cloud of PVC responses





- *"the recruitment, development and motivation of researchers are critical drivers of research excellence;*
- collaboration, creating and implementing research strategies, securing a mix of funding and responding to competitive pressures important factors in success
- *"on-the-ground"* or *"day-to-day"* initiatives by individual researchers are as important as the *"high-level strategic" initiatives instigated* by *institutions."*
- So.....
  - Involve people -- engage & empower, participants not passengers
  - Listen and demonstrate that leaders hear
  - Communicate, Communicate, Communicate



# Vision and strategy

- FBMH Vision
  - We empower people from diverse backgrounds to transform their ideas in biology, medicine, and health for the benefit of society in Manchester, the UK and across the globe.
- Focus until now has been to create an operational faculty, with a vision and broad strategic goals
- So critical now to develop the scientific strategy
  - To promote better collaboration and integration of science in biology medicine and health
  - Top down or bottom up?
  - Context of Manchester and the North

### The context for FBMH: health inequalities

MANCHESTER 1824





### **Manchester: Strength in Clinical Trials**





The Northern Powerhouse already exists in health sciences, driven by Manchester





Connected Health Cities: employing the UK's unique global advantage in health & social data to promote The University of Manchester **innovation and inward investment** 

- Health North's Connected Health Cities is a global first, a 'super-system' using NHS and social data, for health and economic gain
- These data, already collected from 15M Northern population, will be safely integrated and applied to patient care pathways, research and innovation
- *Connected Health Cities* will analyse these data at scale to
  - Drive public sector reform for better health and care
  - Deliver better NHS commissioning ٠
  - Promote Public Health and local authority planning  $\bullet$
  - Accelerate Research and innovation leveraging national  $\bullet$ investments and supporting precision medicine
- This unique integrated 'super-system' creates a magnet for business
- Empowers rapid translation creating inward investment from the global trillion dollar digital health market.
- *Connected Health Cities* is scaleable designed to roll out across the UK





# Context for FBMH Change and Opportunities

- Increased recognition that biomedical and health research requires critical mass and collaboration to be effective and internationally competitive
- Advances in biomedical science have created enormous potential
  - Greater understanding of disease
    - Precision medicine approach
- Interaction with environmental and social factors
  - Social determinants of health account for much avoidable mortality and incur huge costs to a health care system
- Health informatics can link health and social care data identifying phenotypes for targeted interventions
- But TRANSLATION of those advances into tangible health benefits has 'stalled' at two key steps where interfaces occur
  - Innovation and Diffusion
- 15-20 years for innovation to be in routine NHS Practice
- An opportunity for FBMH as research and innovation must link to integrated service delivery in the NHS with the unique opportunity of Devolution



Integration of Research, Education and Practice Excellence in Health & Life Sciences

"In the teaching hospitals care of patients and furtherance of teaching and research would receive equal emphasis" Goodenough 1944





The University of Manchester

"In the teaching hospitals care of patients and furtherance of teaching and research would receive equal emphasis" Goodenough 1944

### Integration of Research, Education and Practice Excellence in Health & Life Sciences

JULY 22, 1944

THE TRAINING

#### THE TRAINING OF DOCTORS REPORT BY THE GOODENOUGH COMMITTEE

The report of the Interdepartmental Committee on Medical Schools, under the chairmanship of Sir William Goodenough, has been published this week by the Ministry of Health and the Department of Health for Scotland.<sup>1</sup> The report is unanimous. It is signed by the chairman, by Sir John Stopford (vice-chairman), Prof. T. R. Elliott, Dr. A. M. H. Gray, Prof. James Hendry, Prof. A. V. Hill, Sir Wilson Jameson, Prof. J. R. Learmonth, Sir Ernest Pooley, and Dr. Janet Vaughan. Fundamental changes in the training of doctors to meet the requirements of a comprehensive National Health Service underlie the committee's recommendations, which are the outcome of a review, occupying two years, of the organization of medical education. The main proposals are briefly summarized below. Integration of Research, Education and Practice Requires Integration of approach from Industry, Universities and NHS

Research

Innovation & Excellence

Practice

Education



Integration of Research, Education and Practice Requires Integration of approach from Industry, Universities and NHS

Universities

Innovation & Excellence Industry Health service





## Health Innovation Manchester

Putting research & innovation at the heart of a devolved health & social care system





- FBMH has
  - strength and scale in research and education
  - unique position with Devo and the strengths and challenges of the North
- Exciting opportunity for FBMH to empower people from diverse backgrounds to transform their ideas in biology, medicine, and health for the benefit of society in Manchester, the UK and across the globe.





